

IN THE CLAIMS

The following is a complete listing of the claims, and replaces all earlier versions and listings.

1. (Original) A moving image coding apparatus for coding noninterlaced moving image data, comprising:

input means for inputting noninterlaced moving image data;

generating means for generating new image data by arranging line data of two consecutive frames in a predetermined order;

subband decomposing means for frequency-transforming the image data to decompose the data into a plurality of subbands;

coding means for coding the image data decomposed into the plurality of subbands; and

output means for outputting the coded image data.

2. (Original) The apparatus according to claim 1, wherein said subband decomposing means decomposes the image data into a plurality of subbands by using two-dimensional discrete wavelet transform.

3. (Original) The apparatus according to claim 1, wherein said generating means generates new image data by alternately arranging the line data of the two frames upon changing the order.

4. (Currently Amended) The apparatus according to claim 3, wherein the apparatus further comprises comprising storage means for temporarily storing the line data of one of the two frames, [[and]]

wherein said generating means generates new image data by using the line data of one frame of the moving image data which is directly input and the line data of the frame stored in said storage means.

5. (Original) The apparatus according to claim 1, wherein said generating means arranges an odd line of an odd frame and an even line of an even frame on the same line, and arranges an even line of the odd frame and an odd line of the even frame on the same line.

6. (Original) A moving image decoding apparatus for decoding interlaced image data from coded data of image data in which line data of two consecutive frames are arranged in a predetermined order, comprising:

input means for inputting the coded data;

subband decoding means for decoding a predetermined subband from the coded data;

subband combining means for reconstructing image data by combining decoded subbands;

frame decomposing means for decomposing the reconstructed image data into odd and even fields; and

output means for outputting decomposed frames.

7. (Currently Amended) The apparatus according to claim 6, ~~wherein the~~ apparatus further comprises comprising designation means for designating whether coded data of image data in which line data of two consecutive frames are arranged in a predetermined order is decoded by interlacing or noninterlacing,

wherein

if it is designated to perform decoding by interlacing, said input means inputs only coded data containing no predetermined high-frequency component, and

if it is designated to perform decoding by noninterlacing, said input means inputs coded data associated with all frequency components.

8. (Currently Amended) A moving image coding method of coding noninterlaced moving image data, comprising:

a generating step of generating new image data by arranging line data of two consecutive frames of noninterlaced moving image data in a predetermined order;

a subband decomposing step of frequency-transforming the image data to decompose the data into a plurality of subbands; and

a coding ~~[[means]]~~ step of coding the image data decomposed into the plurality of subbands.

9. (Original) A moving image decoding method of decoding interlaced image data from coded data of image data in which line data of two consecutive frames are arranged in a predetermined order, comprising:

a subband decoding step of decoding a predetermined subband from the coded data;

a subband combining step of reconstructing image data by combining decoded subbands; and

a frame decomposing step of decomposing the reconstructed image data into odd and even fields.

10. (Currently Amended) The method according to claim 9, ~~wherein the method further comprises~~ comprising a designation step of designating whether coded data of image data in which line data of two consecutive frames are arranged in a predetermined order is decoded by interlacing or noninterlacing,

wherein

in [[the]] said subband decoding step, if it is designated to perform decoding by interlacing, a subband is decoded by using only coded data containing no predetermined high-frequency component, and

if it is designated to perform decoding by noninterlacing, a subband is decoded by using coded data associated with all frequency components.

11. (Currently Amended) A computer program stored on a computer-readable medium which, when executed, performs a method for coding noninterlaced moving image data, ~~wherein a computer is caused to execute the method comprising:~~

a generating step of generating new image data by arranging line data of two consecutive frames of noninterlaced moving image data in a predetermined order;

a subband decomposing step of frequency-transforming the image data to decompose the data into a plurality of subbands; and

a coding ~~[[means]]~~ step of coding the image data decomposed into the plurality of subbands.

12. (Currently Amended) A computer program stored on a computer-readable medium which, when executed, performs a method for decoding interlaced image data from coded data of image data in which line data of two consecutive frames are arranged in a predetermined order, ~~wherein a computer is caused to execute~~ the method comprising:

a subband decoding step of decoding a predetermined subband from the coded data;

a subband combining step of reconstructing image data by combining decoded subbands; and

a frame decomposing step of decomposing the reconstructed image data into odd and even fields.

13. - 29. (Canceled)